DOCUMENT RESUME

ED 185 424 CE 025 192

AUTHOR	Selz, Nina; Jones, Joan Simon
TITLE	Adult Learning: Implications for Research and Policy in the Eighties. A Symposium. Information Series No. 194.
INSTITUTION	Ohio State Univ., Columbus. National Center for Research in Vocational Education.
SPONS AGENCY	National Inst. of Education (DHEW), Washington, D.C.
PUB DATE	79
GRANT	NIE-G-78-0211
NOTE	48p.
AVAILABLE FROM	National Center Publications, The National Center for Research in Vocational Education, The Ohio State University, 1960 Kenny Road, Columbus, OH 43210 ($3.25)
EDRS PRICE	MF01/PC02 Plus Postage.
DESCRIPTORS	*Adult Education; *Adult Learning; Conferences; *Educational Policy; *Educational Research

ABSTRACT

Themes and thoughts (rather than a literal transcription of proceedings) are presented on a symposium held in November, 1979, on the research, policy, and practice of adult learning. Participants were federal officers, adult education professors, researchers in business and education, and policy developers. The symposium was organized around four major areas: (1) current events in adult education; (2) issues concerning the translation of research into practice; (3) policy implications; and (4) the future of adult learning. Each area was addressed by a panel with comments from the audience. The document is divided into three parts: the symposium and a general overview, the main meeting discussion summaries, and specific recommendations and written reactions to the meeting. Names and addresses of the participants are appended. (MEK)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

ED185424

Information Series No. 194

ADULT LEARNING: IMPLICATIONS FOR RESEARCH AND POLICY IN THE EIGHTIES

A SYMPOSIUM

Nina Selz
Joan Simon Jones

The National Center for Research
in Vocational Education

and

Panel Recorders:

Waynne James, Oklahoma State University

Ruth S. Nickse, University of Massachusetts

James T. Parker, U.S. Office of Education,
Bureau of Occupational and Adult Education

Paul G. Taylor, Institute for Adult Competency

The National Center for Research
in Vocational Education
The Ohio State University
1960 Kenny Road
Columbus, Ohio

1979

U S DEPARTMENT OF HEALTH, EDUCATION & WELFARE
NATIONAL INSTITUTE OF EDUCATION

THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY

CE 025 192

A Final Report
On a Project Conducted under
Grant No. OB-NIE-G-78-0211

The project presented or reported herein was performed pursuant to a grant from the National Institute of Education, Department of Health, Education, and Welfare. However, the opinions expressed herein do not necessarily reflect the position or policy of the National Institute of Education, and no official endorsement by the National Institute of Education should be inferred.

U.S. DEPARTMENT OF
HEALTH, EDUCATION AND WELFARE

National Institute
of Education

THE NATIONAL CENTER MISSION STATEMENT

The National Center for Research in Vocational Education's mission is to increase the ability of diverse agencies, institutions, and organizations to solve educational problems relating to individual career planning, preparation, and progression. The National Center fulfills its mission by:

- Generating knowledge through research
- Developing educational programs and products
- Evaluating individual program needs and outcomes
- Installing educational programs and products
- Operating information systems and services
- Conducting leadership development and training programs

FOREWORD

A major emphasis of the National Center for Research in Vocational Education's research and development activities for the 1980's is the disenfranchised minority adult learner. Therefore, it was our privilege to host a symposium that focused on problems and considerations of the adult learner. We think that the substantive content expressed in these proceedings of the symposium will be of use to educators, policy makers, and researchers in adult education.

The support of federal officers concerned with policy in adult and occupational education in an undertaking of this nature is gratifying. We thank Paul Delker and Jim Parker of the Bureau of Occupational and Adult Education, U.S. Office of Education, and Bob Stump, National Institute of Education, for their participation. The participation of all persons, as evidenced by the thoughtful commentary herein, is appreciated.

Our special thanks go to Waynne James, Ruth Nickse, Jim Parker, and Paul Taylor for their performance as panel recorders. We are grateful to William Ziegler, National Center for Research in Vocational Education, Xavier Del Buono, California State Department of Education, and Elaine Shelton, University of Texas at Austin, for reviewing this document.

The symposium was hosted by the Transferable Skills and Occupational Adaptability Project which is funded by the National Institute of Education. Our gratitude is extended to William Ashley, Program Director, and his staff for their work in setting up the symposium.

Robert E. Taylor
Executive Director
National Center for Research
in Vocational Education

TABLE OF CONTENTS

	Page
FOREWORD	iii
PART I: SYMPOSIUM STRUCTURE AND OVERVIEW	1
Introduction	1
Structure and Participants	1
Overview	2
PART II: PANEL DISCUSSIONS	4
Panel 1: Mining the Data Base	4
Panel 2: Ways and Means	7
Panel 3: Frameworks, Motives and Economic Justice	12
Panel 4: Preferred Futures and Public Support	20
PART III: RECOMMENDATIONS AND REACTIONS	26
Recommendations for Research Agenda and Follow-up	26
Reactions from Symposium Observers	27
APPENDIX A: SYMPOSIUM PARTICIPANTS	35

PART I: SYMPOSIUM STRUCTURE AND OVERVIEW

Introduction

The proceedings of the symposium on adult learning are being expressed as themes and thoughts, not as a literal transcription of what was said and done. The intent of the meeting was not to report on research we are currently doing but to create instances for dialogue among persons working in adult learning. Papers were not read, but issues were raised and discussed. Challenges were given and needs for focus debated.

This document is divided into three parts. The structure of the symposium and a general overview are presented in Part I. The main discussions are summarized in Part II. Specific recommendations and written reactions to the meeting are given in Part III. Names and addresses of participants are appended.

The symposium was held as part of the scope of work of the Occupational Adaptability and Transferable Skills Program at the National Center for Research in Vocational Education. The program, under the direction of William L. Ashley, is sponsored by the National Institute of Education.

Structure and Participants

Thirty persons were invited to the National Center for Research in Vocational Education, The Ohio State University, Columbus, Ohio, November 27-28, 1979, to participate in a symposium on the research, practice, and policy of adult learning. The symposium was organized around four major areas: (1) what is currently happening in adult learning; (2) issues concerning the translation of research into practice; (3) policy and implications; and (4) the future of adult learning. Each area was addressed by a panel with comment and conjecture from the audience.

The first panel, chaired by William D. Dowling, included Beverly Anderson, Norvell Northcutt, Max Lowe, and Waynne James, recorder. The second, chaired by Nevin Robbins, consisted of Patrick Penland, Lloyd Longnion, Harold Beder, Robert Fellenz,

and Jim Parker, recorder. The third, chaired by Robert Stump and recorded by Ruth Nickse, included Dorothy Westby-Gibson, Jamison Gilder, and John Peters. The fourth, chaired by Warren Ziegler, consisted of Winifred Warnat, Carlene Turman, Ronald Miller, and Paul Taylor, recorder.

Several persons presented special information or verbal reactions at scheduled times. George Bonham and Paul Delker began the first day's session, and three persons from local agencies--Lynn Johnson, Hugh Clark, and Tom Harnish--began the second day. Dr. Howard McClusky provided a historical perspective for participants.

John Tibbetts, Laurel Ellis, and Karin Stork-Whitson served as reactors to the symposium, and their remarks are recorded elsewhere in the proceedings. The remaining persons were staff members of the Transferable Skills Program, hosts of the symposium.

The participants were federal officers, adult education professors, researchers in business and education, and policy developers. The group was small in order to encourage individual participation. Representatives of many disciplines and organizations were not present but should be included in similar efforts.

The intent of the symposium was to produce a structure whereby a broad look at the present and the near future of adult learning research activities would emerge; we aimed for an overview from which we might gain perspective and direction. The long-range goal was to promote communication and sharing among persons concerned with adult learning research and its implications for policy and future development.

Overview

A thought presented early in the meeting by George Bonham, Editor of Change, and reinforced by Warren Ziegler, was a concern for a more humanistic approach and broader view of adult learning. Bonham wondered "if we had not lost sight of the human being until the adult had become merely another lab animal for study." Ziegler exhorted us to consider adult learning as part of human learning. In addition, he wished us to consider education itself as a special case in human learning; we were asked to think in new ways.

On the other hand, Northcutt pointed out that we know little about how adults learn or, for that matter, what they want to learn as opposed to what we want to teach. The lack of knowledge

and data in adult learning was an underlying theme. Questions which surfaced were: "Is our concern for us, the literate, or for them, the illiterate?" (and) "Because our livelihood is linked with institutional learning, are we capable of looking at the real questions in adult learning?" We were asked to rethink our premises and assumptions.

Another theme developed through various discussions was the need for researchers to go beyond thinking (and talking) and into action. We were asked not only to do but to do well. Penland stressed a need for good instrumentation, especially in national surveys that get quoted and built into policy. Peters presented a criterion for good research. Anderson discussed nontraditional assessment and applied performance testing as better ways of measuring adult learning.

Aid for conceptualization and planning was suggested. Dowling presented definitions and a format for studying the adult learner. Turman demonstrated a feedback model from industry for viewing the learner in the total system or environment. Northcutt gave a model to synthesize literature. and Gilder presented a framework for policy decisions.

Participants perceived various needs. Lowe and Longnion, as administrators of adult learning programs, expressed a need for translators of research. Basic research needs to reach the audience that can use it, and research findings have to be in an accessible form. Penland, Clark, and Harnish spoke of the potential of media and computer technology for instructional purposes and the need to expand our use of information retrieval and dissemination.

Professor McClusky claimed that we have not yet taken seriously what being an adult means. "What," he asked, "does life look like in terms of time yet to live and time past?" Dr. McClusky called for an emphasis on a life-span view, collaboration between researchers and practitioners, the establishment of constructive linkages with adjacent disciplines, and a broader use of methods and techniques of research and analysis available to us through other disciplines.

As Bob Stump began the panel discussion on implications of research, he asked the provocative question, "If one had the means, what one piece of research in adult learning would one do?" Answers came not only from this group but also from the fourth panel--to raise our sights from the present to the future. In so doing, we were asked to be risk takers in developing appropriate methodologies and theories and in planning outcomes for practice and policy.

PART II: PANEL DISCUSSIONS

Panel 1: Mining the Data Base

Bill Dowling, Chair
Waynne James, Recorder

Beverly Anderson
Max Lowe
Norvell Northcutt

This panel was charged with providing alternative perspectives in adult learning as well as baseline information and substantive data. To do so the panel structured the discussion around (1) a framework for viewing the adult learner, (2) an overview of research questions and conclusions drawn from the literature, (3) aspects of testing, and (4) practitioner and special group concerns.

DEFINITIONS AND FRAMEWORK FOR VIEWING THE ADULT LEARNER

The following definitions describe "adult" and "learning" for dialogue and frame of reference:

adult - one who has assumed responsibility for self and/or others

learning - acquisition of knowledge, attitudes, or skills which affect and create a potential for new behavior

These definitions can be used to give meaning to a format for viewing and arranging information about the adult learner. Such a format would be structured according to demographic characteristics of learners, the learning process, environmental factors influencing the adult learning, and the unique aspects of special groups. Consideration of demographic characteristics would involve discussion of physiological, psycho-emotional, psycho-intellectual, and sociological aspects of behavior. Attention to the adult learning process would demand development of theory-based learning processes, discussion of the effect of individual characteristics on content concerns, the most effective institutional arrangements, and the selection of appropriate methodologies.

If the concern lies with environmental factors influencing the adult learner, consideration should be given to the learner's goal orientation, to institutional availability and capacity, to instructional content, to teacher characteristics, and to non-verbal situational displays.

Lastly, the uniqueness of special groups needs to be considered when looking at the adult learner. Attention would be paid to the issues and concerns in such areas as adult exceptional learning, aging, community college and technical school learning bases, disadvantaged learners, military education, learning in correctional institutions, parenting, and multi-cultural adult learning.

QUESTIONS RELATED TO ADULT LEARNING

For a variety of reasons, investigators of learning have generally ignored adults. Adult learning settings are not the traditional research settings. Adults tend to demand to be taught (or to learn) what they consider "important." For these and other reasons, adults are difficult to study. One way to begin to cut through the difficulty is to assess and synthesize the literature.

Such an assessment and synthesis has been begun by Norvell Northcutt and others and has yielded a model which groups the literature according to cognitive processes, ideological processes, and socialization processes. The cognitive processes literature derives from perceptual and cognitive psychology, and research relies heavily on description and prediction of cognitive style. The literature of ideological processes concerns itself with such influential personal characteristics as self-concept, values, and locus of control. The socialization process literature, stemming as it does from anthropology and sociology, discusses family, peers, impinging institutional structures, and other social settings as they are faced by adults.

Links between these three processes have not been studied, and such linkages are fertile ground for new research efforts. Moreover, as a self-contained area, cognitive style would seem to provide one of the most salient and productive topics. Likewise, there are indications of differences between adult and youth learning. The frame of adult reference, for example, is built on the past, while children lack the experiential background necessary to make choices. Yet, no new large-scale survey research is being conducted beyond that done by Tough and Penland in the area of self-planned learning. Research has usually tried to answer immediate kinds of problems; basic questions have not been researched and answered.

A TESTING PERSPECTIVE

One of the major issues in adult learning deals with the concept of testing and its current status in adult education. A crucial concern of those working with adults is how to assess what is actually occurring in the learning process. Two basic points about testing support discussion in this area:

- Testing can be defined as a systematic procedure for observing an individual's behavior and describing it with a numerical scale or category system.
- Testing is a tool which can be used in a variety of situations.

Testing can be used in making decisions about instruction. Survey assessment and assessments made in formative or summative evaluation are useful in program development and evaluation. In decision-making concerning status, testing is a large part of selection and certification. And, in instructional management, testing is used in the process of diagnosis, guidance, and placement.

Applied performance testing (APT) holds potential for assessing the adult learner. Vocational education provides a good example of APT with its emphasis on evaluation of the performance of job tasks in actual job situations. Assessment centers offer a great promise for delivering testing services.

However, various needs must be addressed. These include the need for accurate matching between testing and its purposes; the development of well designed testing instruments and the appropriate use of existing instruments; and the need to evaluate and accredit learning as opposed to experience. Problems exist in administrative areas--teachers are hired to teach, not to assess--and lack the needed assessment training. Compounding such problems are the lack of funds to support instrument development and the fact that individuals are most familiar with paper/pencil tests or the more traditional forms of testing.

PRACTITIONER AND SPECIAL GROUP CONCERNS

Dealing with students in adult education classes creates unique concerns and situations. Most prominent, perhaps, is the need to address the characteristics of disadvantaged learners. Such characteristics include low family income, failure in the

conventional school setting, minimal job experience and work preparation. Also included are those personal characteristics of disadvantaged adults which derive from their place in the class structure: lack of self-confidence, a life style which is not mainstream, and rage against an academic and social structure which alienates them from productive participation.

Aspects, then, which practitioners may be charged with addressing include the provision for student and program matching as well as vital counseling and support services; attention to student attitudes; the need for a better assessment process; and the maintenance of quality standards.

Most suggestive of the relationship between the practitioner and special groups may be the need to eliminate unrealistic, outdated, and irrelevant standards for disadvantaged learners--i.e., the need to recognize that good programs for the disadvantaged are remarkably like good exemplary programs. These programs help determine where a student is and then take the student systematically to where s/he ought to be.

Panel 2: Ways and Means

Nevin Robbins, Chair
Jim Parker, Recorder

Hal Beder
Bob Fellenz
Lloyd Longnion
Pat Penland

This panel addressed a set of charges relating to examples, issues, and concerns of putting research into practice. The specific topics addressed included the following:

- Conceptualization of the notion of "research into practice"
- Impressive research and impressive practice
- Encouraging/inhibiting factors in adult learning research and practice
- Next steps for research into practice and improvement of practice through research

RESEARCH INTO PRACTICE

The notion of research into practice can be viewed from a variety of perspectives. It can, for example, imply the use of a new knowledge generated by research, and the research can be of at least three types: basic, developmental, and institutional. It can also be viewed as the need to identify the "usefulness" of research and sound adoption; or, contrarily, as the need to make research explicit to those whose practice the research is guiding. It can be added, then, that the potential of the concept of research into practice will likely be realized by the development of the role of translator, i.e., the interpreter or disseminator. As Lloyd Longnion suggests, "the when and how of these roles will be determined when both the researcher and the practitioner move out of their limiting stereotypes and establish regionally based, but locally sensitive, collaborative networks."

It is understood, then, as Patrick Penland states, that the considerable descriptive research in adult learning has not been developed into a field of practice.

IMPRESSIVE RESEARCH

Some examples of research which impressed panel members included work on self-planned/self-directed learning, the methodological possibilities for learning projects, the research in self-actualization, and research in areas such as needs assessments and evaluation. (Hal Beder notes, however, that while much is being done in this area, little is finding its way into the knowledge base; this may be because this type of research is very location specific.)

Also considered impressive is the research that encourages the development of theories <u>for</u> rather than <u>of</u> the practice of adult learning. The following questions related to this research can then be asked:

- Where are the researchers formulating the revolutionary theories that will impact the practice of adult learning?
- Is it possible to create a support structure which will assume the risks for implementing revolutionary research findings?

IMPRESSIVE PRACTICE

Areas of practice identified as most impressive include the efforts of the National Center for Educational Brokering, the Appalachian Adult Learning Projects (Mooreland State University), Education Information Centers, and the College Entrance Examination Board librarian programs. Also considered impressive are the competency-based adult education programs and their efforts to document effects of adult learning through demonstration of competencies.

Other promising practices include business-efficiency operational models, libraries as learning centers, the Highlander School, and adult learning as problem solving.

ENCOURAGING/INHIBITING FACTORS IN ADULT LEARNING RESEARCH AND PRACTICE

Seven major concerns in this area can be discussed. They are:

- Using technology
- Research translation
- Meeting today's needs
- Research-development discrepancies
- Self-initiated learning
- Good and bad research
- Research usefulness

Using Technology

It can be argued that both adult learners and those persons facilitating learning must become "computer literate"--must learn to access learning technology. It can then be added that technology must innovate to the point that "face-to-face" access between learner and facilitator is assured. As Patrick Penland points out, "the helping relationship, encompassing information processing, self-initiated learning, and communication patterns,

has not generally been delineated as to function, scope, or interdisciplinary aspects."

Research Translation

In the complex world of adult learning practice, it is suggested that a series of "translator" devices are needed. Specialized techniques need to be developed for influencing the behavior of such diverse groups as professors, teachers, and decision-makers and policy setters. Research findings need to be translated appropriately into practice and policy; practice needs and policy decisions must be translated into research hypotheses.

Meeting Today's Needs

Research should address strategies to meet today's needs. As educators, the charge is not to echo the past but to provide learning for adults that is appropriate and in keeping with the times. Teaching of basic skills is only part of instruction. How to deal with global and complex issues--use of energy, unemployment, crime in the streets, etc.--is another need of the day.

Research-Development Discrepancies

It is suggested that current (known) research activities tend not to reflect the investments that state directors of adult education are making in development and demonstration. An example is the fact that although over half of the available development funds in adult education for the past two years have supported competency-based and related efforts, very little research has been devoted to this important area. The analogy of ships passing in the night would seem appropriate.

Self-Initiated Learning

This and related questions deserve considerable comment. If the question is how research in self-initiated learning has been translated into practice, the reply can be that facilitators have been trained to assist adults on a case load basis and to assume the role of learning consultant. The question can also be answered by indicating how the Cooperative Assessment of

Experiential Learning (CAEL) model of competency assessment procedures is used to determine which competencies could be creditable.

The question of how adult education can be conducted so that it does not intercede negatively in the natural process of adult learning can be addressed through the encouragement of self-initiating approaches to learning. (However, it must also be recognized that remuneration for such assessment and consultant services may be an issue.)

Another question concerning teaching responsibility can be addressed. It can be suggested that the K-12 community as well as postsecondary institutions can be responsible for encouraging self-directed learning.

Good and Bad Research

The issue can be raised concerning who makes judgments about which research is "good" or "bad". The question can be addressed by suggesting that research is never value-free, that research should not be just technically good but also useful, and that the process of adult learning is amoral; it is the content which is good or bad.

Moreover, it can be suggested that perhaps as little as ten percent of all research is sound and competently done; only ten percent of that amount may be agreed upon by researchers. It can then be added that most practitioners do not have the capability to evaluate research, nor the opportunity to develop that capability.

Research Usefulness

It can clearly be stated that not all research has to be used in practice. Basic research, done competently, may have intrinsic value. However, it can be agreed that developmental and operations (institutional) research should have a payoff in adult learning practice.

NEXT STEPS

The following "next steps," while not a comprehensive listing of necessary actions, are indicated:

- Develop communication processes for information sharing among researchers and practitioners.
- Exercise national leadership in setting research agendas, sponsoring additional symposia, distributing information, etc.
- Shift emphasis from the many available descriptive studies to more analytic research employing hypotheses about planning, decision-making, and appraising by the individual.
- Enlarge the scope of analytic research to include information processing and communicative patterns of individual self-initiated learning.
- Provide for project experimentation (demonstration) with variants of the traditional local educational authority for administering interdisciplinary teams. Provide for case load delivery of individual service.
- Identify and develop policy to deal with discrepancies between research priorities and development/demonstration investments in the various adult education programs sponsored by the Department of Education and other federal agencies.

Panel 3: Frameworks, Motives, and Economic Justice

Bob Stump, Chair
Ruth Nickse, Recorder

Jamison Gilder
John Peters
Dorothy Westby-Gibson

This panel considered the development of policy and how policy considerations at federal, state, and local levels contribute both to the focus and selection of research efforts and are affected in turn by the results of research efforts. The panel discussed (1) research topics, (2) criteria for evaluation of research, (3) modes of investigation, (4) recommendations for

policy-setting, and (5) a model for policy frameworks. This panel discussion was followed by (6) extensive participant reaction.

RESEARCH TOPICS

Research emphasis should be on descriptive and/or analytic studies which would examine the following:

- Questions and topics basic to understanding the adult learning process.
- Cognitive styles and learning strategies of different individuals and groups in recognition of the nation's increasing cultural diversity.
- The abilities of persons to develop both global skills and the skills of cognitive switching.
- Systems of adult learning that include examination of adult learner behavior, adult teacher behavior, and curriculum design.
- Effective staff development programs to support implementation of research findings.
- New structures and new persons to provide Adult Basic Education (ABE) services to those most educationally disadvantaged.

CRITERIA FOR EVALUATION OF RESEARCH

The need to establish criteria by which to evaluate the appropriateness of research studies in adult learning is recognized. These criteria, as suggested by John Peters, might include:

- The extent to which the research topics are consistent with the goals chosen by researchers and funders for adult education.
- The extent to which the research builds on useful prior work.
- The extent to which the research has true, theoretical underpinnings.

- The extent to which the research is ecologically valid, with potential for guiding effective interventions.

- The manner in which single variable studies are "reapproached" with multivariate analysis.

MODES OF INVESTIGATION

Several possible modes of investigation appropriate to the criteria for evaluation of the research are proposed. The modes of investigation should:

- Be interdisciplinary.

- Involve the persons being studied in planning and implementation.

- Focus on specific target populations.

- Contribute to the development of methodologies more appropriate to the study of behavior than those of the physical sciences--such as ecological and anthropological approaches.

- Be funded on a long-term basis by specific appropriations.

RECOMMENDATIONS FOR POLICY

Creation of a framework for both short and long-term planning efforts at the state level is recommended. This would then involve building in a continuous process that would ensure constant review.

The establishment of new funding modes for adult education programs is recommended. These modes would be based on performance, not attendance, in recognition that this is more consistent with self-initiated, home-based learning and the life styles of adults. Also suggested is support for the development of assessment as a major area in education involving not only new techniques but also the new roles of assessor (as distinct from teacher).

Other recommended actions and considerations include the following:

- Make adjunct faculty legitimate within academic structures.
- Encourage self-initiated learning.
- Promote the training and use of cadres of high school literacy volunteers in urban areas.
- Fund projects related to those most in need (the disenfranchised).
- Consider provision for separate funding streams or set-asides, in the adult education amendments, for basic research in adult learning.

MODEL FOR POLICY FRAMEWORKS

The model proposed by Jamison Gilder would change the responsibility and funding source for adult education. The model should be considered as an idea for deliberation and debate. It is presented as a response to the rapid rate of change in our society, and the resulting impact on policy. It attempts to depict the effects on policy of the increased diversity of the population. It should be viewed as non-linear; for, as Jamison Gilder points out, "We are all illiterate in these areas at one time or another." The model is not bound to any instructional strategy (either formal or nonformal) nor to self-directed learning. It is neither age specific nor institution specific. (See illustration of the model on the following page.)

"Policy frameworks are state economic issues," continues Gilder, "and until the learning needs of areas one and two are met, area three should not be supported [by federal and state monies]."

PARTICIPANT REACTION

The participants reacted strongly. Among issues deliberated are (1) the control and responsibility for adult learning, (2) the focus of research on those in need, (3) the politics of adult education, and (4) the motives of researchers, service providers, and policy makers regarding human and economic justice.

A MODEL FOR POLICY FRAMEWORKS
(proposed by Jamison Gilder)

	BASIC CORE NEEDS	OCCUPATIONAL/VOCATIONAL/ TECHNICAL/PROFESSIONAL NEEDS	EXISTENTIAL NEEDS
Types of Needs	These needs are . . . tool subjects such as reading, writing, and computation, and emergent common needs such as computer literacy, energy related information, and civic participation.	These needs are . . . correlated to economic success in the work world.	These needs are . . . individually chosen areas of study, or personal needs such as confronting mid-life crises.
For Whom	Specifically, these are the common needs of all people, used on a daily basis.	Specifically, these are individual needs and abilities.	Specifically, these are individual and personal and do not occur on a daily basis.
Supporting Arguments	Arguments in support of this area are moral ones.	Arguments in support of this area are the costs/benefits to society.	Arguments in support of this area are those of personal responsibility.
Support and Responsibility	Support and responsibility is Federal.	Support and responsibility is State and Employer.	Support and responsibility is the Individual.

Control and Responsibility Concerns

The nature of questions which focus on the issues and control and responsibility for adult learning arose partially from presentation of Gilder's model. The model prompted such questions as . . .

- If federal or state government supports (pays for), does it necessarily mean they control?
- Should the government control area three, existential needs?
- How can we help to meet universal needs in a context-free and value-free manner so that the skills learned are transferable?

and such opinions as . . .

- "Perhaps federal responsibility may be the support of such things as video discs for people who can't afford them."
- What is the public interest in enabling some individuals to work their way through mid-life crises but not to balance their checkbooks?"
- "You can still vote for President while you're seeking your identity but not if you can't read the ballot. There is a difference of effect on participation."
- "Our culture could be considered primitive or advanced [the criterion being the extent to which it meets these needs]."

The Focus of Research

Defense was given to the issue of supporting research focusing on those most in need. Opinions presented, however, were:

- "How cultural differences affect learning of basic skills is not known."
- "Until more is known about the disenfranchised, we cannot improve our services to them."

- "Maybe a reason why there is such a dropout rate is that there is no match between their needs and our services."

The Politics of Adult Education

References made to the politics of adult education point out that the recent study of adult literacy by Hunter and Harmon stresses that the problem is a political one and centers around "who do we want to keep down, and why?" This discussion leads clearly to the subject of motives in the field of adult learning and economic justice.

Motives of Researchers, Service Providers, and Policy Makers Regarding Human and Economic Justice

Several sensitive areas are the concern here. Questions regarding human justice, for example, asked whether illiterate individuals exist because those who seemingly address their needs want and need those individuals to be illiterate. Also asked is the question of whether or not researchers and others do research to create new roles for themselves or to absorb (and exist within) the good design of more formal systems; i.e., whether or not the products of a system are also the desires of the system.

Some preventive speculations can also be put forth. It is suggested that researchers and others in adult education and adult learning examine themselves and their directions more closely before involving themselves in research and policy agendas; that they have lost their risk taking capacities; and that they should emphasize in their work not how to enable people to perform basic skills but how to be innovative. And, finally, it is posited that perhaps economic justice and economic opportunity are aggregate macro problems which, in principle, cannot be solved by more educational opportunity.

Panel 4: Preferred Futures and Public Support

Warren Ziegler, Chair
Paul Taylor, Recorder

Ron Miller
Carlene Turman
Winifred Warnat

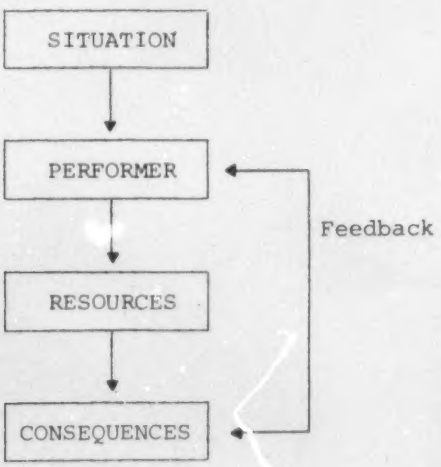
The last panel at the symposium dealt with the question of what has to be done--with the preferred future. What ought to happen rather than what will happen, suggested in strong terms, characterized the discussion. The discussion opened with the following assumptions:

- That learning is "good".
- That adult education leads to something--whether it be self-actualization, a learning society, a stronger economy, etc.
- That people know what their needs are--and that studying functional literacy assumes that these needs exist and can be met in some way by some type of adult learning activity.

The ensuing discussion was then structured around four topical areas: (1) a performance analysis model, (2) the knowledge society, (3) educational policy analysis, and (4) a search for new meanings.

A PERFORMANCE ANALYSIS MODEL

A basic performance analysis model from industry was presented by Carlene Turman as a new, different, and perhaps better way of looking at adult education clients within a total environment. Here, as stated earlier, education may not always be the answer. The model is illustrated as follows:



Ruth Nickse *(left)*,
Jamison Gilder

Robert Fellenz *(left)*,
Lloyd Longnion
Patrick Penland

Howard McClusky

George Bonnam

Dorothy Westby-Gibson *(left)*,
John Peters

Paul Delker

Carlene Turman *(left)*,
Warren Ziegler
Lynn Johnson

Beverly Anderson
William Dowling

Paul Taylor *(left)*,
Winifred Warnat

Norvell Northcutt *(left)*,
Wayne James

This is a simple feedback model which can be applied to an individual (the performer) in a given specific, discrete situation, task, or job. It may also be applied to a community or society.

Within the model contexts, problems may arise in an environment or system which are out of, or beyond, the control of the individual. The causes may be a lack of standards or resources; task interference, lack of clarity or lack of feedback, or a negative balance of consequences.

In training or adult education, a deficiency of knowledge, not of the individual, is most often considered. It is suggested then, that this model may help focus research attention on deficiencies of the individual and ecological systems.

THE KNOWLEDGE SOCIETY

Most futurists agree that ours is a knowledge society; and, as such, that adult educators and researchers should assume a leadership role. Extensive review of literature and observation leads to similar conclusions:

- That we do not know what the adult learning process is and how it changes over the life span.
- That there seems to be a lack of seriousness about the mission of adult education.
- That adult education needs to go beyond programmatic positions and current issues and concerns and take the lead in new areas.
- That research tends to concentrate on needs identification and participant response.
- That research on learning which concentrates on cognitive style is called into question by recent brain research which indicates that only about six percent of our brain activities are in cognitive areas.
- That we are stymied in the quantitative analysis area which places severe limitations on using appropriate methodology.

There is a need to emphasize that theory is lacking. Just as learning theory dominated the thirties and motivation theory the fifties and sixties, developmental theory is the product of the seventies. But is suggested that we look at developmental

theory in too linear a fashion and that we need to go on to the next step--vertical progression in development theory, for example.

It can be concluded that we must look beyond education. Physical development, sexual development, family life, work life, and leisure are factors which must also be included in adult education research.

EDUCATIONAL POLICY ANALYSIS

It can be noted, rather soberly, that after 3,000 studies have been conducted on innovations within organizations, we still have no real theory. It may also well be that we have no theory in adult learning. This makes postulating policy analyses and obtaining public support somewhat difficult.

Three dimensions of policy analysis and how they relate to the future of adult learning need to be discussed. These are:

- Provision of educational services by public funds.
- Access and choice of educational opportunity.
- Measurement of equity.

Public provision of services can be considered in terms of participation in adult education with such variables as barriers and life stages. It can also be rendered as a cost/benefit issue. Policy requires data, and data can be used to develop theory. Thus far, what information we have on such things as participation and persistence in adult education programs have not come together to the extent that we know more about intervention strategies. The elements surrounding cost/benefit analysis are mainly economic. Public funds are involved in many cases. The need in the future is for better measurements of noneconomic benefits.

In recent years there has been greater attention given to information and personal decision-making as it relates to the process of access to, and choice of, learning opportunities. Self-directed learning, counseling, brokering, and education information centers are all dealing with the ways information transfer facilitates learning. We need, therefore, better evaluation of what works in this area in order to understand the impact of more accessible information and learning opportunities on organizational goals and structures.

One important element of the very complex issue of the measurement of equity is federal financial assistance (which is addressed here in a very limited fashion). It is important to understand that, because the federal government funds postsecondary participants rather than institutional programs, we need to look at who is getting the funds. It can be stated, further, that less than ten percent of the funds are being paid to part-time adult students while these students make up over forty percent of participants in colleges and universities.

A SEARCH FOR NEW MEANINGS

The position is taken that we are about to take a giant step forward--somehow not denigrating our old ideas, practices, or theories while at the same time saying that something new is happening. We see that adult learning has become a major aspect of our work and that we will either be at the forefront of a leap into new meanings and understandings or be left behind.

It is very clear, for example, that what is coming in the areas of electronics, information processing, and multiple communications development and management fields will not wait for us. We will need new ideas much as we will need new metaphors to replace those of our "industrial society." We will need to understand that education is a special case of human learning, and we will need to understand the phenomenology of human learning.

Five propositions can be suggested for leading us into the future and for responding to the question of how we are to deal with learning which is fully human:

(1) We must understand, with grave implications for research, policy, and practice, that the human being, the person as both adult and child, is a person before he or she is a learner.

(2) Learning takes place in a community of learners. To be in such a community, however large or small, requires us to understand that in order for each of us to learn we need to enable and emancipate the learning of other persons.

(3) Learning that is fully human is understood as the assigning of new meanings to experience in such a way that we can intervene and impact on that experience whether that experience is psychomotor, cognitive, or affective.

(4) In order to pull learning apart and recast it as a research activity, we must know that human learning involves always intention or choice on the part of the learner, performance by the learner, the context of that performance, and the consequences of that performance.

(5) What would it be like if we acknowledged that the human person is, in principle, and ought to be, capable of owning his or her own learning?

In the words of Warren Ziegler . . .

> What we must learn, somehow, is to help each other do risk taking as our next step: to support ourselves in the multiplicity of inquiries, practical as well as theoretical, program oriented as well as research oriented, which will enable us to make the next step toward the construction of a new understanding of human learning.

PART III: RECOMMENDATIONS AND REACTIONS

Recommendations for Research Agenda and Follow-up

Prior to the close of the meeting, participants were asked to consider general recommendations for research, practice and policy and specific recommendations for continuing the momentum begun in this symposium. These are listed for your consideration and use.

Research Agenda Items

- A communication network for the exchange of data and information on adult learning is desired which would/could access other related information networks.
- Researchers in adult learning areas help each other to frame and ask (research) questions.
- From the resources available to researchers in adult learning, a collection of research documents and material should be made available.
- Where does the present meet the preferred future? Policy studies, alternative futures, and radical political criticism should receive more attention, and be given a place in the research.
- Ways of looking at state and/or federal educational policy in terms of preferred future(s) which are free from the usual forms of accountability (e.g., head counts, FTE's) and considerations of existing institutional structure(s) should be considered.
- There is a need to conduct research into curricula that will train adult education practitioners to function proficiently in the preferred future(s).
- Research in the areas of self-planned and self-directed learning needs to be expanded.

- Model sites need to be established where persons may ask questions about learning and make observations on how people learn.

- Adult learners, (i.e., the public at large) should be attending meetings (such as the symposium) on the subject of learning.

- Attention has to be given to the question of how researchers communicate with practitioners.

- Regional or group collaboration on future research should be sought.

- Detailed attention should be given to policy studies.

Specific Recommendations: Symposium Follow-up

- A follow-up meeting of the participants and/or some others should be held, perhaps in a year's time.

- Tag-on meetings (e.g., at national conventions) of persons with adult learning research concerns should be considered.

- More meetings should be provided where opportunities for discussion and interaction of participants are encouraged.

- In another meeting, have an indepth discussion and look at the models presented by Northcutt, Gilder and Turman.

- Hold a similar meeting adding the following: more representation from business, industry and labor; same participants for continuity; hard-core practitioners; some of the recognized names in adult learning or development; representatives from other disciplines.

An additional thought is provided by Jamison Gilder: "We may have been too white, middle class, and administrative to see clearly the next-steps required by our ideas."

Reactions from Symposium Observers

The following reactions are provided for you from four symposium participants. Two of the reactors are college professors,

one from the West coast and one from New England. John Tibbetts gives us "A California Perspective" and Laurel Ellis looks back at what happened in the symposium. Karin Stork-Whitson, a researcher, highlights those aspects of adult learning that were not discussed. Lloyd Longnion, in his own style, gives us a practitioner's view.

A California Perspective by John Tibbetts

Just as all of us respond to daily stimuli from the cultural milieu and ecology in which we live, this reaction to the Adult Learning Symposium selectively relates specific issues to the California scene.

Research gatherings, like cocktail parties, frequently contribute to a general feeling of ennui. It was a pleasant surprise to discover this group wasn't honoring a "star" and was organized to move efficiently through a generally recognized agenda of concerns. Not that there wasn't some "posturing" for attention, such as, some expressions of guilt for neglecting to read research studies others had found time to read, or some obvious enjoyment of the jargon of "interfacing," "networking," "operationalizing," and "developing instrumentation"--but these elements were all pleasantly few and the group appeared rather quickly to become a congenial, productive unit. Having a practitioner who refused early to be "put off" or "put down" was unquestionably an asset to the group's sense of perspective.

Some think the California scene is one big cocktail party of hot tubs and peacock feathers. Unfortunately this is not the case. There are some 700,000 Californians who are "structurally (constantly) unemployed"--even in the best of times. Research, in fact, "suggests" that if those who become unemployed do not find new jobs or educational intervention within three months, they are likely to join the structurally unemployed.

Nor are we a state of golden-haired sun worshippers and surfboarders. It is predicted that by 1990 California will become the first Third World State in the U.S.--that is, having more than half of its population of minority groups, especially Black, Hispanic, and Asian. What, then, will be the educational needs of California adults? How will they learn?

With these central questions in mind, the Adult Learning Symposium provided some exciting and insightful perspectives. Toward the issue of CULTURAL DIVERSITY, several provocative but unanswered questions were raised by Northcutt: Why, in a sophisticated society, do undereducated adults exist? What adaptive, productive behavior compensates? What is the influence of cognitive styles on learning?

Most of the presenters referred to research on self-directed learning. But this research is greatly in need of findings relating to undereducated adults, different cultural groups, and low income populations. Because cultural diversity includes both age and sex, it is important also to stress the need for research into learning needs and styles of older adults. Both Warnat and McClusky noted these shortcomings. As McClusky commented, "Life does last to the end."

Likewise, we are beginning to understand more about cognitive learning styles for children of various ethnic and cultural groups, but little is known about learning styles for such groups at any adult age.

Central to learning and to cultural diversity are VALUES. Ziegler's model, for example, stresses that we are persons before we are learners. Research, on the other hand, has generally focused on behavior rather than value structures, even though values may prompt the behavior. Thus, both Miller and Ziegler raised the issue of CHOICE in learning. To Ziegler's model, learning is a matter of choice.

Do multicultural adults with differing values make different learning choices? How often do these choices conflict with societal goals?

Certainly California is not the only state whose populations are changing. We may be changing more rapidly than most, but age distributions, sex roles, and ethnic mobility influence us all. The relationship of these changing populations with their own value orientations must surely interact not only with the societal environments but the learning environments as well. Turman noted that we have been looking at knowledge rather than forces of the environment such as task interference, lack of resources, and feedback. Northcutt also spoke to anthropological research patterns that might answer questions of the influence of social structures on learning. Related, too, are Peters' plea for ecologically valid research and Fellenz's question of what frees the adult to learn.

Ultimately, we are not looking merely at isolated bits of research into multicultural modes of learning, value structures and learning, or ecological influences on adult learning, but the interrelationship of these forces and the appropriate results in PRACTICE.

Throughout the symposium, the discussion of whether the research/practice dichotomy is real was probably in large measure a familiar academic exercise. One participant, suggesting that researchers need to simplify their language for practitioners, was met with the rejoinder, "But then they say 'we knew that

already.'" Many participants, however, acknowledged that there must be full participation of the practitioner in the design and development of research. If we achieve such collaboration including adult clients while avoiding oversimplification from isolated bits of research, we might in fact avoid much of the research that "explicates the obvious" as suggested by the above quote.

If learning is illustrated through change in behavior and education is organized change, then we might well ask on what basis change occurs if not based on research? Gilder and Clark both spoke to the effects of "rapidity of change" and Stump asked what changes would improve learning.

From this California perspective, research is needed that explores the interrelationships of adult cultural diversity, learning styles, value systems, and environments. The results of such research might make possible valid personalized change models appropriate to specified social settings. Too much to ask?

In Retrospect by Laurel Ellis

In anticipation of a symposium of this sort, one envisions a select group of researchers giving summary reports of their findings and making appropriately perceptive, critical comments throughout. At the conclusion, participants return to their daily endeavors, encouraged by having had their work acknowledged by colleagues, and continue their individual pursuits per usual.

In retrospect, this symposium was not as stereotyped as above. The group included not only researchers, but professors, administrators, consultants, staff developers, and representatives from professional associations, a magazine, and media technology. In short, participants represented a broad base of perspectives on the topic: there were those who offered a theoretical knowledge base, those who disseminated this base and related findings, and, finally, those who by practice tested this knowledge base and indicated the need for further testing and research.

Another way in which this symposium differed from the typical was in its tone. Early in the meeting discussion centered on identifying where we were in our collective knowledge about adult learning and on setting appropriate directions for further inquiry. However, rather than expend energy approving what has been done in research and practice, thereby justifying present endeavors and roles, the group took advantage of the time to question the validity of what is being done in the field and

to suggest needed change. The forum which emerged was as broad-ranging in perspectives as the group participating in it. Research on all levels--policy making, program planning, and delivery systems--came under scrutiny. The tone of this symposium was one of willingness to communicate as a group and to question. Such an exchange may signal potential for other such groups to begin setting mutual directions for growth and change in the field.

A few areas of interest mentioned during the symposium could initiate some redirection of effort in adult education. Among issues addressed were: 1) the expressed need to move toward qualitative research and away from research design for numbers; 2) the politics and control of literacy, and 3) context-sensitivity and choice as keys to adult learning. The latter theme was brought in from many perspectives: the extent of "brain-work" in learning; social, cultural, and psychological influences on adult learning; and appropriate programming and delivery systems for the self-directed learner. As the individual and human aspects of the adult learner were re-emphasized, the caution was clear for future study: do not underplay the complexity of the adult learning process. Large-scale studies of adult participation or motivation may reveal very little relating to individual learning. For graduate students, researchers, professors, teachers, program planners, or policy makers, the impact of pursuing such concerns would adjust the parameters of our knowledge base in the field and influence practice in adult education for the next decade.

This symposium had much participant impact. Before concluding, the group listed areas for action aimed toward maintaining the momentum generated by the symposium. For these participants, the return to individual endeavors was clearly affected by the experience.

From a practical point of view, we in the field can utilize the symposium results in setting directions for our endeavors in graduate programs, staff development, research, program planning, etc. Moreover, by example, this symposium has proven that such a diverse grouping can be brought together with a positive outcome. Communication across such perspectives is important; a common language can be established for that purpose. Such beginnings could be enhanced upon a regional and local basis with much potential benefit for adult education as a field and for individual adult learners including ourselves.

Some Addenda by Karin Stork-Whitson

Although my educational background is in the area of adult and continuing education, I have for several years been involved

in the job assignment vagaries of a soft-money R&D institution. My work has not been in the area of adult learning, and some of it has only indirectly related to adults. However, over the years I have been associated with a number of individuals involved in research and, therefore, approach this writing with some very strong feelings about conducting research. The inevitable discussions among symposium participants about the usefulness of research, about the involvement of the practitioner in research efforts, and about the objects of the research (i.e., adult learners) did take place.

In the course of the discussions, it was gratifying to observe strong support for making both practitioners and adult learners participate in the research effort. But, adult learners among special needs populations were addressed only to a limited degree-specifically those for whom English is a second language. A number of others whose learning needs are different and whose learning styles are affected by a broad array of contingencies were excluded--groups such as the incarcerated, ex-offenders, disadvantaged unemployed, out-of-school individuals, and women in transition. The need for more attention to these populations of adult learners cannot be denied. Research needs to concern itself not only with the differences in learning styles among these populations but particularly with what Bill Dowling identified as the "demographic characteristics" and the "uniquenesses" of these groups and the profound effect these factors have on their successes and failures as learners.

Some questions that might now be raised are:

- What are the factors which cause adults to be unable to acquire the adult learning or survival skills essential to their success as members of society?
- If the factors can be identified, can their effects be checked?
- Is the traditional value-laden definition of the word "success" inappropriate for special needs groups?

The fact that the symposium participants were all Caucasian women and men did not go unnoticed by the participants themselves. What are the factors which account for the absence of minority group members with recognized expertise in the field of adult learning? Are members of the minority groups not entering graduate programs in adult learning? Are they not being encouraged to develop expertise in adult learning? Are they entering but not excelling in the field? Are they developing expertise but not achieving recognition? These questions are worth asking, and they must be answered. The extent to which the adult

learning research community addresses these questions will necessarily be the extent to which the real needs of adult learners can be met.

A Practitioner's View by Lloyd Longnion

What those researchers need is a little dose of "practitioner therapy" to get them out of their university laboratories and down to our earth. With these thoughts I attended the symposium on adult learning. As someone working day-by-day to plan and administer programs for adult learners seeking to obtain basic literacy skills and prepare for high school equivalency examinations, I was at least skeptical about what I could add to, much less take away from, such a gathering. After all, as I conduct the mundane tasks of working with a staff of 38 part-time teachers in ten sites spread over a 5500 square mile area of rural South Central Texas to deliver adult education to willing adults, how much help do I get from the researcher? In an average week--none. In an exceptional week--some.

Well, much to my satisfaction the gathering resulted in the following impressions:

- With few exceptions the researchers saw a gap between their practice and our practice.
- With few exceptions the researchers seemed willing to take actions (both research design and dissemination) to bring research and practice together.
- With few exceptions the researchers admitted that the task of discovering what adult learning is, is as baffling to them as conducting the effective practice of adult learning is to the practitioners.
- Researchers are as stymied by their organizational and political constraints as we are in practice.
- The assumptions that guide research are as fragile as those that guide practice.
- Both the researcher and the practitioner are limited in their impact on the adult learning environment by the lack of facilitative public policy.

Finally, my impression of the effect that the symposium had upon me is that I now have, while operating in that proverbial "field or front line," the potential of support from another struggling community of fellow learners--the future focused,

risk taking researcher. Together with the adult learner, the potential partnership of researcher and practitioner may just create a new myth of adult education that will accommodate the varied needs of adult learners. Perhaps I can now list the researcher as one of the community resources with which I collaborate to deliver educational services to adults. (Let's see--should I put their phone numbers above or below my Dial-A-Prayer listing?)

APPENDIX A:

SYMPOSIUM PARTICIPANTS

Adult Learning: Research, Practice, Policy
A Symposium
November 27-28, 1979

1. Beverly Anderson
Northwest Regional Educational Laboratory
710 S.W. Second Avenue
Portland, Oregon 97204
(503) 248-6946

2. William L. Ashley
Research Specialist
The National Center for Research
in Vocational Education
1960 Kenny Road
Columbus, Ohio 43210
(614) 486-3655

3. Harold Beder
Rutgers University
Graduate School of Education
10 Seminary Place
New Brunswick, New Jersey 08903
(201) 932-7532

4. George Bonham
Editor, Change Magazine
NBW Tower
New Rochelle, New York 10801
(914) 235-8700

5. Hugh Clark
President, Decision Research Corporation
21 East State Street
Columbus, Ohio 43215
(614) 224-0623

6. Paul Delker
Bureau of Occupational and Adult Education
U.S. Office of Education
Washington, D.C. 20202
(202) 245-2278

7. William Dowling
160 Ramseyer Hall
The Ohio State University
Columbus, Ohio 43210
(614) 422-5037

8. Laurel Ellis
University of Southern Maine
Gorham, Maine 04038
(207) 780-5326

9. Robert Fellenz
Adult and Extension Education
Texas A & M University
College Station, Texas 77843
(713) 845-6816

10. Jamison Gilder
Life Long Learning Project, AACJC
One Dupont Circle NW
Suite 410
Washington, D.C. 20036
(202) 293-7050

11. Thomas Harnish
OCLC, Inc.
1125 Kinnear Road
Columbus, Ohio 43214
(614) 486-3661

12. Waynne James
Oklahoma State University
Occupational and Adult Education
Stillwater, Oklahoma 74074
(405) 624-6275

13. Lynn Johnson
Ohio Board of Regents
Lifelong Learning Project
Columbus, Ohio 43215
(614) 466-4158

14. Joan Jones
Graduate Research Associate
The National Center for Research
in Vocational Education
1960 Kenny Road
Columbus, Ohio 43210
(614) 486-3655

15. Kate Kitchen
Graduate Research Associate
The National Center for Research
in Vocational Education
1960 Kenny Road
Columbus, Ohio 43210
(614) 486-3655

16. Lloyd Longion
Adult Learning Center
190 East Garza
New Braunfels, Texas 78130
(512) 625-5950

17. Max Lowe
Utah Technical College
4800 South Redwood Road
Salt Lake City, Utah 84107
(801) 969-3411

18. Howard McClusky
School of Education, Room 2034
The University of Michigan
Ann Arbor, Michigan 48103
(313) 764-5520

19. Ronald Miller
Future Directions for Learning Society
College Entrance Examination Board
888 Seventy Avenue
New York, New York 10019
(212) 582-6210

20. Ruth Nickse
College of Public and Community Service
Downtown Campus
University of Massachusetts
Boston, Massachusetts 02125
(617) 287-1900, ext. 305

21. Norvell Northcutt
Southwest Educational Development Lab (SEDL)
211 East 7th Street
Austin, Texas 78701
(512) 476-6861

22. James Parker
Bureau of Occupational and Adult Education
U.S. Office of Education
Washington, D.C. 20202
(202) 245-9751

23. Patrick Penland
SLIS
University of Pittsburgh
Pittsburgh, Pennsylvania 15260
(412) 624-4141

24. John M. Peters
University of Tennessee
15 Henson Hall
Knoxville, Tennessee 37916
(615) 974-3071

25. Nevin Robbins
Research Specialist
The National Center for Research
in Vocational Education
1960 Kenny Road
Columbus, Ohio 43210
(614) 486-3655

26. Nina Selz
Research Specialist
The National Center for Research
in Vocational Education
1960 Kenny Road
Columbus, Ohio 43210
(614) 486-3655

27. Karin Stork-Whitson
Research Specialist
The National Center for Research
in Vocational Educaiton
1960 Kenny Road
Columbus, Ohio 43210
(614) 486-3655

28. Robert W. Stump
National Institute of Education
1200 19th Street, NW
Washington, D.C. 20208
(202) 254-5736

29. Paul Taylor
293 Claremont Avenue
Montclair, New Jersey 07042
(212) 690-6678

30. John Tibbets
San Francisco State College
Department of Secondary and Postsecondary
Education
1600 Holloway Avenue
San Francisco, California 94132
(415) 586-1340

31. Carlene Turman
Xerox International
108 West Rosement Avenue
Alexandria, Virginia 22301
(703) 777-8000, ext. 5506

32. Winifred Warnat
Teacher Corps Adult Learning Potential Project
5010 Wisconsin Avenue, NW, Suite 305
Washington, D.C. 20016
(202) 686-2834

33. Dorothy Westby-Gibson
San Francisco State College
Department of Secondary and Postsecondary Education
1600 Holloway Avenue
San Francisco, California 94132
(415) 586-1340

34. Warren Ziegler
President, The Futures-Invention Associates
1250 South Williams Street
Denver, Colorado 80210
(303) 733-1854

REPORTS ON OCCUPATIONALLY TRANSFERABLE SKILLS

McKinlay, B. *Characteristics of jobs that are considered common: Review of literature and research* (Info. Series No. 102), 1976. ($3.80)

A review of various approaches for classifying or clustering jobs, and their use in (a) describing the elements of commonality involved when people make career changes, and (b) understanding better the concepts of occupational adaptability and skill transfer.

Altman, J.W. *Transferability of vocational skills: Review of literature and research* (Info. Series No. 103), 1976. ($3.80)

A review of what is known about the transferability of occupational skills, describing the process or the facilitators of skill transfer.

Sjogren, D. *Occupationally transferable skills and characteristics: Review of literature and research* (Info. Series No. 105), 1977. ($2.80)

A review of what is known about the range of occupation-related skills and characteristics that could be considered transferable from one occupation to another, describing those transferable skills which are teachable in secondary and postsecondary career preparation programs.

Ashley, W.L. *Occupational information resources: A catalog of data bases and classification schemes* (Info. Series No. 104), 1977. ($18.20)

A quick and concise reference to the content of 55 existing occupational data bases and 24 job classification schemes. Abstracts of each data base and classification scheme include such information as: identification, investigator, location, documentation, access, design information, subject variables, occupation variables, and organization variables.

Wiant, A.A. *Transferable skills: The employer's viewpoint* (Info. Series No. 126), 1977. ($3.25)

A report of the views expressed in nine meetings across the country by groups of local community and business representatives concerning the types of transferable skills required and useful in their work settings and how a better understanding of transferable skills could improve training and occupational adaptability.

Miguel, R.J. *Developing skills for occupational transferability: Insights gained from selected programs* (Info. Series No. 125), 1977. ($3.80)

A report of clues and suggestions gained in the review of 14 existing training programs, with recommendations for practice which appear to have been successful in recognizing skill transfer and taking advantage of an individual's prior skills and experience.

Ashley, W.L., & Ammerman, H.L. *Identifying transferable skills: A task classification approach* (R&D Series No. 146), 1977.

A report of an exploratory study designed to test the usefulness of three classification schemes in identifying the transferable characteristics of tasks in diverse occupations.

Pratzner, F.C. *Occupational adaptability and transferable skills* (Info. Series No. 129), 1977. ($6.25)

A summary final report, presenting and discussing an array of issues encountered in the various project activities, and offering recommendations.

Selz, N.A., & Ashley, W.L. *Teaching for transfer: A perspective for practitioners* (Info. Series No. 141), 1978. ($2.35)

An informal discussion of the need for teachers and trainers to give more attention to developing transferability and transferable skills in students for learning and life performance applications. Practical suggestions and techniques for improving the capacity of students to transfer learned skills and knowledge to new situations are given.

Brickell, H.M., & Paul, R.H. *Minimum competencies and transferable skills: What can be learned from the two movements* (Info. Series No. 142), 1978. ($5.10)

A report comparing and contrasting potential impact of the transferable skills and minimum competency testing movements on school programs, staff, and students. Key questions and alternative strategies are presented to assist educational planners and administrators in formulating policy and establishing promotion or completion criteria in secondary and postsecondary education.

THE FOLLOWING REPORTS WILL BE AVAILABLE IN 1980:

Ashley, W.L., Laitman-Ashley, N.M., and Faddis, C.R. (Eds.) *Occupational adaptability: Perspectives on tomorrow's careers* (Info. Series No. 189), 1979.

Proceedings from a national symposium. The topics focused on how training for adaptability can increase the use of human resources in the labor force.

Selz, N. (Ed.) *Adult learning: Implications for research and policy in the eighties,* 1979.

Proceedings from a national symposium on adult learning. Topics include state of the art, research into practice, policy implementation, and future directions.

Wiant, A.A. *Self-assessment for career change: Does it really work? Summary report of a follow-up study* (Info. Series No. 191), 1979.

An analysis of the impact of self-assessment on one's subsequent employment experience. The particular assessment technique studied is one intended to help identify those skill attributes which have provided satisfaction in various life experiences. Outcome measures included skill utilization and job satisfaction.

Selz, N.A., and Jones, J.S. *Functional competencies in occupational adaptability and consumer economics,* 1979.

Perceptions of national adult samples are reported. Document includes where competencies should be taught —at home, at school, on-the-job, self-taught—and how important these competencies are in successful work and life activities.

Kirby, P. *Cognitive style, learning style, and transfer skill acquisition,* 1979.

A review and synthesis of the literature in adult learning styles, as they relate to the acquisition of transfer skills.

Knapp, J.E. *Assessing transfer skills,* 1979.

A review of traditional and non-traditional assessment with respect to the assessment of transfer skills.

Sommers, D. *Empirical evidence on occupational mobility* (Info. Series No. 193), 1979.

A review and synthesis of the literature on the characteristics of occupationally mobile workers and their jobs.

Laitman-Ashley, N.M. (Ed.) *Women and work: Paths to power* (Info. Series No. 190), 1979.

Proceedings from a national symposium that offer perspectives on women in the work force. Topics will cover five major transition points that any person can experience in a lifetime.

ORDERING INFORMATION

All prices include postage and handling. When ordering use series numbers and titles. Orders of $10.00 or less will be accepted on a cash, check, or money order basis only. Purchase orders will be accepted for orders in excess of $10.00. Please make check or money order payable to: THE NATIONAL CENTER FOR RESEARCH IN VOCATIONAL EDUCATION. Mail remittance and/or purchase order to National Center Publications, The Ohio State University, 1960 Kenny Road, Columbus, Ohio 43210. (Prices subject to change.)